

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application. No claim amendments are made or intended to be made in this listing,
5 which is provided here merely as a convenience to the Examiner and to provide continuity across application documents.

Listing of Claims:

Claim 1 (previously presented): A method for optimizing a playout delay of packets
10 being transmitted within a network, said packets comprising data for playout, said network having a network delay of packet transmission, the method comprising:

- (a) detecting a packet communication mode, wherein packet communication modes comprise a full-duplex mode and a half-duplex mode;
- 15 (b) calculating a playout delay for a current packet based on the detected packet communication mode and the playout delays of previous packets; and
- (c) delaying playout of the current packet by the calculated playout delay.

Claim 2 (original): The method of claim 1 wherein in (b) when the packet communication mode is detected to be the half-duplex mode, the calculated
20 playout delay for the current packet is longer than when the packet communication mode is detected to be the full-duplex mode.

Claim 3 (original): The method of claim 1 further comprising:

- (d) calculating a mean network delay variance for the current packet; and
- 25 (e) determining an estimated jitter for the current packet referencing the mean network delay variance;

wherein in (b) the playout delay for the current packet is calculated further based on the estimated jitter for the current packet and playout delays of previous packets.

5 Claim 4 (previously presented): The method of claim 3 wherein in (b) when the packet communication mode is detected to be the half-duplex mode, the calculated playout delay for the current packet depends more on the playout delays of the previous packets than when the packet communication mode is detected to be the full-duplex mode.

10 Claim 5 (previously presented): The method of claim 3 wherein in (b) when the packet communication mode is detected to be the half-duplex mode, the calculated playout delay for the current packet depends less on the estimated jitter for the current packet than when the packet communication mode is detected to be the full-duplex mode.

15 Claim 6 (original): The method of claim 3 wherein the estimated jitter for the current packet as determined in (e) further depends on a scaling factor that is set according to the packet communication mode as detected in (a).

Claim 7 (original): The method of claim 3 wherein calculating a playout delay for the current packet in (b) further references a smoothing factor that is set according to the packet communication mode as detected in (a).

20 Claim 8 (original): The method of claim 1 wherein the playout of the packets is for a voice over Internet protocol (VoIP), videophone, on-line game, and other real-time interactive communication.

Claim 9 (original): The method of claim 1 wherein the network is a computer network or a radio transmission network for wireless phones.

25 Claim 10 (previously presented): A communications device for playing data contained in packets with an optimized delay, said packets comprising data for playout, said

network having a network delay of packet transmission, the playout device comprising:

a playout buffer for receiving and buffering packets;

5 a playout controller for determining playout delays of current packets from estimated network delays, playout delays of previous packets, and a packet communication mode, and for controlling the playout buffer according to the playout delays;

a network delay estimator for calculating estimated network delays of packets and sending estimated network delays to the playout controller; and

10 an active detector for detecting the packet communication mode, wherein packet communication modes comprise a full-duplex mode and a half-duplex mode.

Claim 11 (original): The communications device of claim 10 wherein when the active detector detects the packet communication mode is the half-duplex mode, the
15 playout controller calculates a playout delay for a current packet as longer than when the active detector detects the packet communication mode is the full-duplex mode.

Claim 12 (previously presented): The communications device of claim 10 wherein when the active detector detects the packet communication mode is the
20 half-duplex mode, the playout controller calculates a playout delay for a current packet as depending more on playout delays of previous packets than when the active detector detects the packet communication mode is the full-duplex mode.

Claim 13 (previously presented): The communications device of claim 10 wherein when the active detector detects the packet communication mode is the
25 half-duplex mode, the playout controller calculates a playout delay for a current packet as depending less on an estimated network delay for the current packet

than when the active detector detects the packet communication mode is the full-duplex mode.

Claim 14 (original): The communications device of claim 10 further comprising:

a receiver through which the playout buffer receives packets from the network;

5 a media output device to which the playout buffer outputs packets;

a media input device for receiving packets; and

a transmitter through which the playout device sends packets to the network.

Claim 15 (original): The communications device of claim 10 wherein the media

10 output device is a voice over Internet protocol (VoIP) player, videophone, on-line game, and other real-time interactive communication device.

Claim 16 (original): The communications device of claim 10 wherein the network is a computer network or a radio transmission network for mobile phones.